

# IBZ51

## 兆芯KX-6000系列平台 Micro-ATX主板, 中国自主化处理器

### 特点

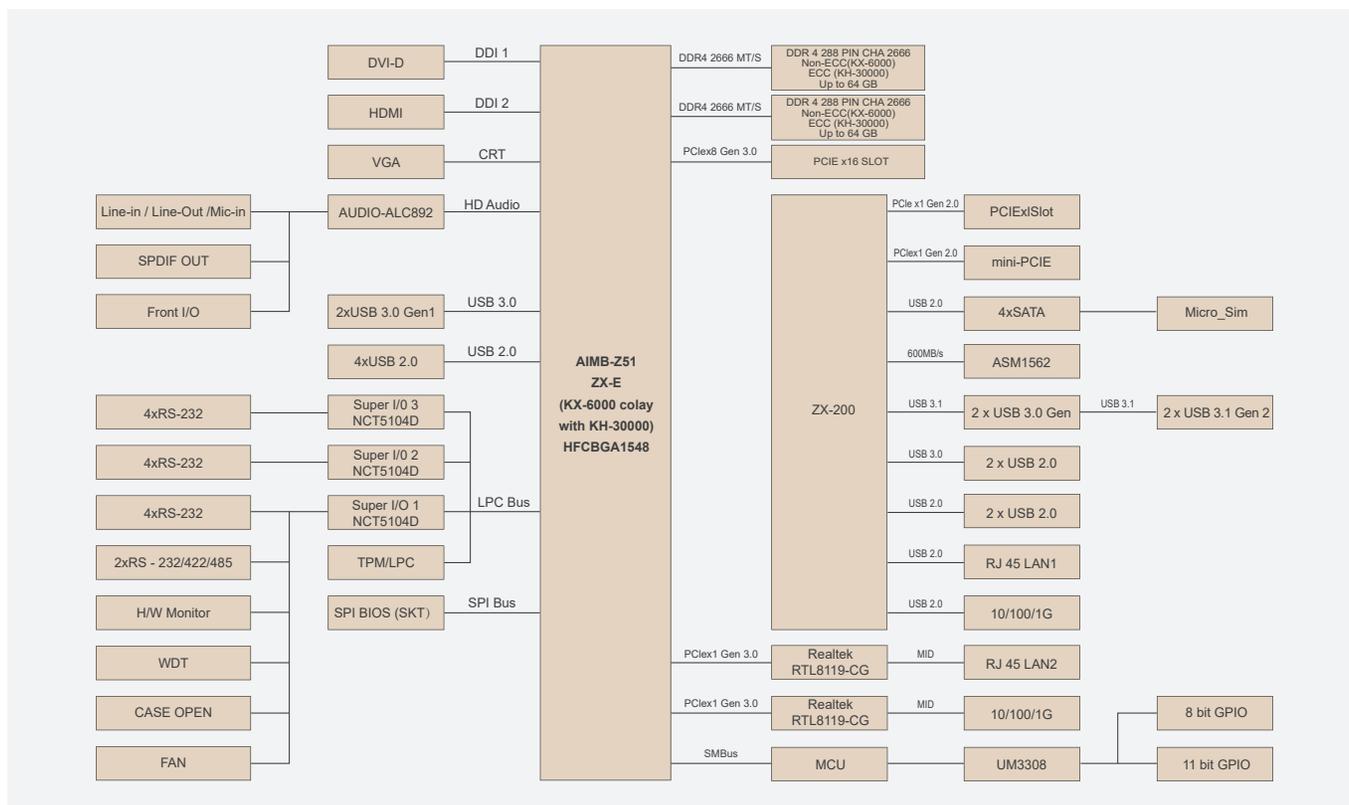
- 中国自主化处理器, 兆芯KX-6000系列平台, ZX-200芯片
- x86 32/64指令全兼容, 支持扩展指令SSE4.2/AVX
- 支持SM3与SM4加速指令
- 支持最大8MB高速缓存
- 支持最高CPU主频: 8核2.7GHz
- 支持四通道, DDR4/2666 UDIMM, 最高容量可达64GB
- 支持三显示VGA+DVI-D, VGA+HDMI, HDMI+DVI-D
- 支持Device on
- 支持Win 7/10及国产麒麟/统信/凝思 Linux操作系统



### 规格

	CPU	KX-U6780A	KX-U6580	KX-6640MA
处理器	最大速度	2.7GHz	2.5GHz	4 Cores@2.2GHz
	功率	70W	70W	25W
	No. of Cores	8 Cores	8 Cores	4 Cores
	Socket	BGA On board		
	芯片组	ZX-200		
内存	技术	Four channel DDR4 2666 MHz SDRAM (Non-ECC)		
	最大容量	Up to 64GB (16GB per DIMM)		
	Socket	4 x 288-pin DIMM		
BIOS	AMI, co-design Byosoft			
显示	DVI-D		1	
	VGA		1	
	HDMI V1.4		1	
	Dual Display		1	
	Dual Display		Yes (VGA+DVI-D, VGA+HDMI, HDMI+DVI-D)	
以太网	接口	10/100/1000 Mbps		
	连接器	2 x RJ45		
扩展槽	PCIe x16 (Gen3)	1 (only PCIe x 8 signal)		
	PCIe x1 (Gen2)	2 (0.5 GB/s per direction, 1 slot switch with Mini-PCIe)		
	Mini PCIe	1 F/S miniPCIe slot support PCIe/USB signal (switch with 1 PCIe x1 slot)		
存储	Micro SIM卡槽	1		
	SATA 3.0	4 (600MB/s per port)		
后置I/O	VGA		1	
	DVI-D		1	
	HDMI		1	
	USB2.0		8	
	USB3.0		4	
	USB3.1		2	
	RJ-45		2	
内置I/O	Audio	1 (Line-in, Line-out, Mic-in)		
	USB 2.0		2	
	串口	12 x RS-232, 2 x RS-232/ RS-422/ RS-485 with selectable RI/ 5V/ 12V power		
	SATA 3.0		4	
	FAN	1 x system FAN header, 1 x CPU FAN header		
	Case open		1	
	TCM		1	
Watchdog Timer	GPIO	1(8-bit)		
	Output	System reset		
Power	Interval	Programmable 1-255 sec/min		
	Input Mode	ATX Mode, 1 x 24-pin ATX, 1 x 4-pin ATX 12V		
环境	Operation Temperature	0 ~ 60°C (32 ~ 140° F)		
	Non-Operation Temperature	-40 ~ 85°C (-40 ~ 185° F)		
Form factor	Micro ATX			
物理特征	Dimensions	244 x 244 mm (9.6" x 9.6")		
	Weight	0.5 Kg		
Humidity		40°C @ 95% RH 非凝结		
Vibration Resistance	3.5 Grms (non OP)			
	Contact ±6kV			
ESD	by air ±8kV			
	OS	KX-U6780A/KX-6640MA 支持Windows 7/Windows 10/Windows XP/Win10 G(政府版Win10)/Linux/国产Win10 (神州网信 Win10) 国产统信/凝思; KX-U6580 支持Windows 7/Windows 10/Linux		

## 系统框图



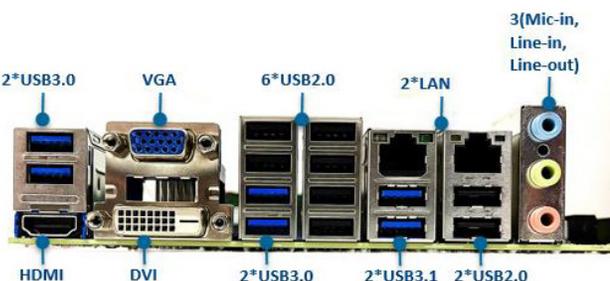
## 订货信息

Part Number	Description	Memory	GbE LAN	USB 2.0	USB 3.0	COM	VGA	HDMI	DVI-D	TCM	SATA	Mini_Pcie	PCIe X1	PCIe X16(only PCIe x 8 signal)
AIMB-Z51-D00A2	KX-U6780A MB	4	2	8+2	6	12+2	1	1	1	1	4	1	2	1
AIMB-Z51-D10A2	KX-U6580 MB	4	2	8+2	6	12+2	1	1	1	1	4	1	2	1
AIMB-Z51-L10A1	KX-6640MA MB	4	2	8+2	6	12+2	1	1	1	1	4	1	2	1

## 配件包

Part Number	Description	Remark
Y5A29A0019	F Cable 40P-2.54/D-SUB 9P(M)*4 40cm COM3-6	1拖4 COM Cable, usage 3
17AD14GS0000082V04	DB 9P/M*2 to IDC 10P*2 cable	1对1 COM Cable, usage 2

## I/O视图



Remark: 所有USB Ports实现软件reset (通过GPIO控制USB实现)  
另, HW monitor、WDT、Smart Fan、SM Bus 都有SUSI porting